

RoadTrip

Rear View Mirror with GPS by VIZUALOGIC



RT-043A USER'S MANUAL

Table of Contents

1. Welcome							1
2. Important Safety Information							1
2. Installation Instructions							1
3. GPS Packing List							2
4. Product Description							3
5. Product Specifications							4
6. Rearview Mirror GPS Appearance and Function Description							6
7. Quick Guide							8
8. Using SD/MM Card							9
9. Start to Navigate							9
10. Detailed Instructions							10
11. Calculator							15
12. Music Interface							17
13. Adding Music							18
14. Video Interface							19
15. Photo Interface							21
16. Flash Interface							22
17. Device settings							23
18. Time setup							24
19. Language Setup							24
20. Volume Adjustment							25
21. System Information							26
22. FAQ							27

Welcome

Congratulations on your purchase of a Vizualogic Rear view mirror with GPS that will provide you with many years of enjoyment. This sophisticated product provides you with vehicle navigation with Bluetooth and a backup camera input without altering the appearance of your vehicle's original interior.

Reviewing this owner's manual thoroughly prior to operation will provide you with the best performance and help explain the simple requirements for proper care.

Important Safety Information

This video product is designed for front driver navigation only. The video portion of this unit should only be used when the vehicle is parked with the emergency brake set. Driver distraction is a major cause of accidents and for this reason many states specifically prohibit the viewing of motion video within view of the driver while the vehicle is in motion.

For safety reasons, when changing the SD card it is recommended that the vehicle be stationary, and that you do not allow children to unfasten seat belts to change SD cards or make any adjustments to the system. System adjustments can be safely accomplished when the vehicle is in park. Enjoy your Vizualogic Rear view mirror with Gps but remember the safety of all passengers is the number one priority.

Installation Instructions

1) Remove factory mirror. (most factory mirrors will have a hex screw to remove it) Fig 1. Refer to your vehicles owners manual for more detailed instructions.

1a) After you have loosened the hex screw remove the mirror by sliding it forward.

2) Mount your new GPS Mirror by sliding it over the factory windshield bracket and tightening the hex screw.

Note: If you find that the mirror has a different mounting type bracket contact your Vizualogic dealer and ask about different bracket availability.

3) Remove factory A-Pillar (this should be done by a qualified technician)

4) Run the wire provided with the mirror and tuck it around the A-Pillar and the headliner.

5) The yellow wire will need to be hooked up to a constant 12 v source.

6) The red wire will need to be hooked up to a accessory wire 12 v source.

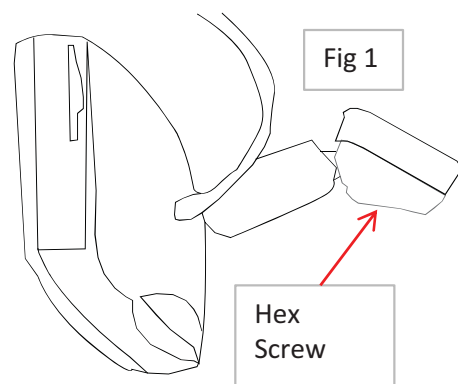
7) The black wire will need to be hooked up to a vehicle chassis ground.

8) The green wire is for reverse sensor for the rear view camera.

9) Video 1 input wire is for aftermarket video input.

10) Video 2 input wire is for aftermarket video input.

11) Camera wire is for reverse camera input.



GPS Packing List

Components	Quantity
Mirror with GPS Navigation	1
Cable with a filter	1
Power Cable	1
User's Manual	1
Car Charger(optional)	
Bracket(optional)	1

Product Description

- 4.3-Inch color TFT High Brightness Display Screen at 320 x 240 resolution
- 1.5W Built-in-Hi-Fi Speaker
- Button + Touch Panel Operation
- Built-in High Sensitive GPS Reception Module
- Built-in GPS Receiving Antenna
- Supports Backup Camera Input
- Supports Data Storage SD/MMC Card or Built-in-Flash
- Music Playback in Mp3, Wav and MIDI Formats
- Video Playback in ASF, AVI, MP4, WMV Formats
- Image Browsing in BMP, JPG, PNG and GIF Formats
- Bluetooth Hands Free Function
- Video Signal Input to Support the Function of A Rear View Camera
- Supports FM transmit function, Frequency Range from 88MHZ to 92MHZ
- Power supply from 9V to 16V

Product Specifications

Environment Parameters

Size	30*8.5*3cm
Working Temperature	-10°C ~ +55°C
Storage Temperature	-20°C ~+85°C
Working Humidity	45%~80%RH
Storage Humidity	30%~90%RH

System Parameters

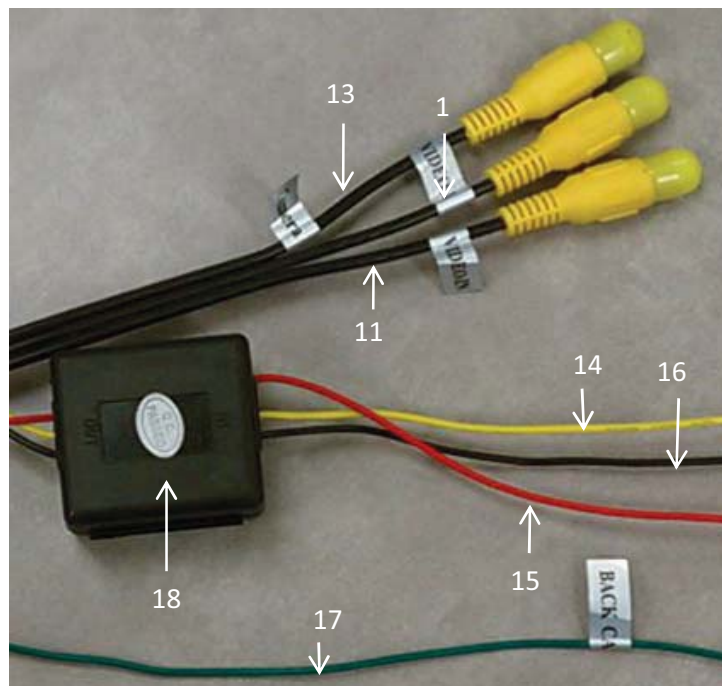
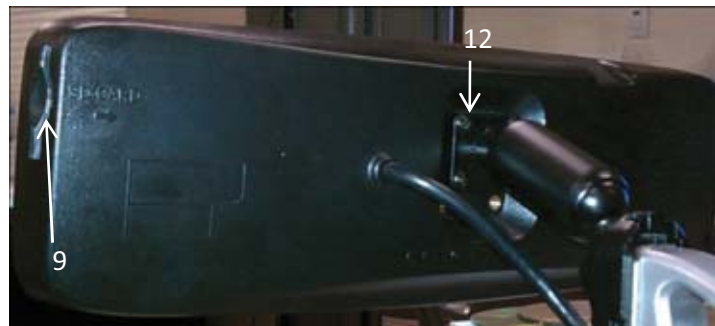
Main Frequency	400MHZ/533MHZ(optional)
Main Chip Type	SAMSUNG S3C2443
Memory	64MB-4G(option)
Expansion Card	128MB~8GB
Navigation Software Storage Medium	SD card or Flash(optional)
Operating System	WINCE 5.0 NET
Software Compilation Method	ARMV41
Navigation Software	Horizon Navigation

GPS Hardware Parameters	
Frequency	1.575GHZ
C/A Code	1.023 MHZ Chip Rate
Channel Number	20 Channels
Tracking Sensitivity	-150dBm
Positioning Sensitivity	10m, 2D RMS 5m, 3D RMS, WAAS enabled
Speed Rate	0.1m/s
Data Update Rate	1HZ
Recapture Time	0.1s on Average
Hot Startup Time	Less than 3s
Warm Startup Time	40s on Average
Cold Startup Time	Less than 100s
Maximum Positioning Height	18,000m
Maximum Speed Rate	515m/s
Acceleration	< 4g
Build-in Antenna Type	Built-in Active Ceramic Antenna
Build-in Antenna Gain	24dB
Build-in Antenna Voltage	3.3V+-5%
Build-in Antenna Current	15ma

Basic Parameters	
Video Input Type	CVBS
Video Input Power	No
Screen Dimensions	4.3
Resolution	320*240
Audio Output(option)	Double Channel CD Sound Quality
Audio Power	4Ω/1.5 w
Standby Power	<20mW
Power Supply	DC9V to 16V

FM Transmitter	
Transmit Frequency	88MHZ~92MHZ
Transmit Distance	3~5 M
MP4 Parameters	
Formats	asf,avi,mp4,wmz
Resolution	320*240
Bluetooth Hands Free Parameters	
Maximum Distance	10m
Communication Type	V1.2
Hands Free Type	Full Duplex Transmission
Chip Set	CSR BLUECORE3

Rearview Mirror GPS Appearance and Function Description



Quick Guide

4.1 Power On/Off

There are two ways to turn on/off the device

- 1) The device will turn on automatically as soon as you start your engine. It will also turn off automatically as soon as you turn off the vehicle.
- 2) Press and hold the Power Button for more than 1 second, to turn the device on. When you want to turn off the device, press and hold the same button for more than 1 second.



Caution When there is no power, the device will turn off automatically.

4.2 Instruction of the Main Menu



Navigation: To Navigate directly.

Bluetooth: To be used as a Hands-Free device.

Assistant: Calculator.

Amusement: Music, Movie, Photo, Flash, etc.

Settings: To setup navigation, FM, volume, background light, time, language etc.

Quick Guide: Brief device guide.

Using SD/MMC Card

The device has a SD/MMC card slot which can be used for multimedia photos and music. To use the SD/MMC card, insert a SD/MMC card into the slot of the device. With the connector pointing to the slot and it's label facing the front of the device. To remove the card, first make sure that applications are not accessing the card, then slightly push the top edge of the card to release. Then remove the card.

- 1) Put the card into the right side slot correctly.
- 2) Do not take the card out when you are operating (such as read, copy etc.) the card, or the data may install improperly.
- 3) Avoid using and storing the card under high temperature or high humidity.
- 4) Keep the card far away from liquid and caustic materials.

Start to Navigate

Navigation is the basic function of this device, below are three simple steps to operate the Navigation software:

The first step: GPS positioning of your location

On the main menu, click the Navigation icon then the system will enter navigation mode. Click the position button; the Gps will begin to orientate the location.

The first time you power up the Navigation it may take up to 5 to 10 min before it picks up your location.

The second step: Set the Destination

- 1) Click the destination button to enter the destination setting interface.
- 2) Click the "name search" to enter the input interface. Then type in the destination of the name you want to research.
- 3) Click OK to enter the name. Then "choose a place" where you want to go to. Click the chosen place to enter the map interface and set the chosen place as the destination.

The third step: Begin to Navigate

After setting the destination, return to the navigation menu, click the button "start to navigate". The system will begin to navigate, then the system will remind you "start to navigate" with a navigation voice.

- 4) When you reach about 300 meters from your destination, the system will remind you that you are close to your destination with voice and enlarge the sample destination when you reach the destination.

Detailed Instructions

1. Bluetooth:

Bluetooth is a wireless technology for creating personal networks operating in the 2.4 GHz band, with a range of 10 meters that enables portable electronic devices, including mobile phones, PDA, wireless headphones, and notebook PC etc, to connect and communicate wirelessly. It's available bandwidth is 1Mhz , analogous to the IEEE 802.11 standard.

The device supports the functions as follows:

- Hands-Free Profile (HFP)

The device can be used hands-free for a mobile phone with Bluetooth. You can use the device for making telephone calls directly and answering the phone through the built-in loudspeaker.

NOTE:

- Not all Bluetooth equipment supports all the Bluetooth specifications. Please refer to the specifications in the instruction manual for the Bluetooth device.
- Under the default situation, the Bluetooth will start when the power is turned on.

2. Connecting the Bluetooth with your mobile phone:

1) Open Bluetooth : On the main menu, click the Bluetooth symbol to enter the Bluetooth interface:



2) Bluetooth setup: on the Bluetooth interface, click "settings" to enter the Bluetooth settings



Bluetooth ON: Choose or to choose if you want the Bluetooth to remain connected.

Auto Answer: Choose or to choose if you want the Bluetooth device to answer all incoming calls automatically.

Pairing code: Enter a 1-8 digit code for pairing your phone, after you enter the code you should get a prompt on your mobile phone display to enter the pairing code. After you receive this message pair your phone with the same code you entered into the mirror.

The pairing code is a safety passkey to protect your personal information. Pair both devices with the same passkey. The passkey is a 1-8 digit code.

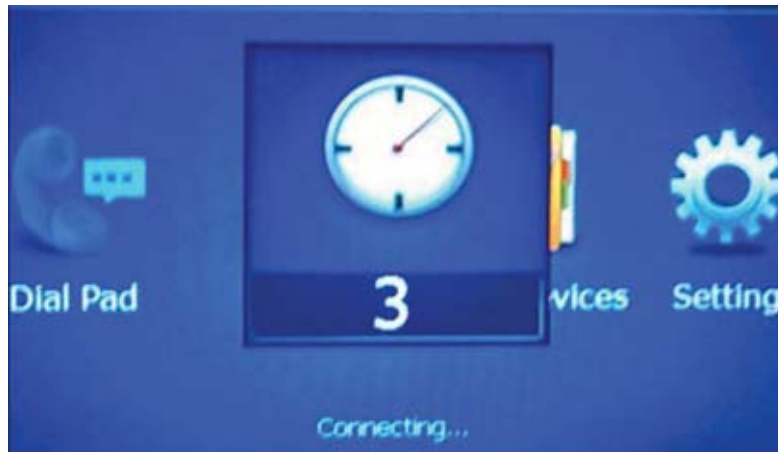
3) Pair with the cell phone

For the first time the user is required to enter the same PIN code on both devices. Once you have entered the PIN code, both devices will generate a link key. The link key can be stored either in the devices themselves or in a permanent storage. Next time both devices will use a previously generated link key. The procedure above is called pairing. Note that if the link key is lost by any device, then pairing must be repeated. For safety, the Bluetooth will not communicate until paired.

Click (pairing) on the Bluetooth interface to pair, now the device is in discoverable mode. The system will go back to the Bluetooth interface if the device is not connected within 60 seconds.



4) Follow the instructions on your cell phone for pairing to the device. When searching for a Bluetooth device, the name will appear as GPS. The default PIN code is 1234. Once the pair match is successful the Bluetooth functions on both GPS and cell phone will be turned on as shown below.



5) After a successful pair, the (Dial Pad) will become colored, and (pairing) will become grey:





Pairing then using

After entering the GPS Bluetooth system, the system will send the connecting signal. If the phone connects automatically, then it will start communicating with the Bluetooth. If it doesn't connect automatically then you will have to pair it manually on your cell phone.

6) Checking the pairing records: click (Pairing Devices) on the Bluetooth menu to check the pairing devices look on the display to see what devices have been paired.





When the cell phone has connected to the device, the "  " will light up red and  is lit up grey

5. Phone connection:

1) Dialing through the Bluetooth:

a. After successfully pairing the device, click (Dial Pad) to dial phone numbers using the touch panel.



b. After you input the number touch the  symbol to send the call:
After the call has ended you can touch the  symbol to end the call or wait until the call has ended and the call will disconnect after a few seconds.

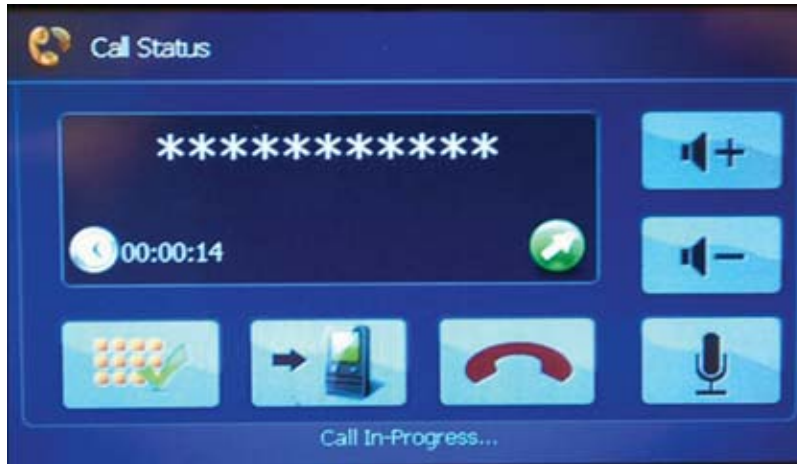
c. Checking the call log: click the (Dial Pad) ,then click the  to check the call log:




The call log is from the cell phone, so some data can not be displayed because of incompatibility of some mobile phones.

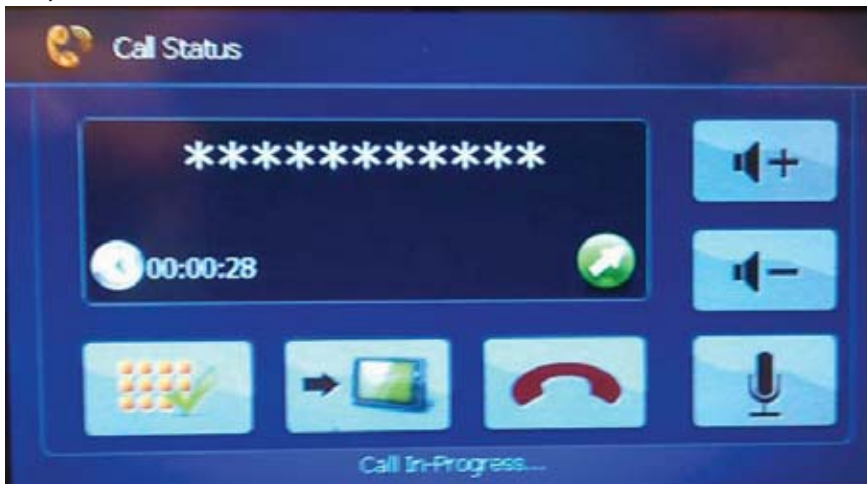
2) Answering the call through the Bluetooth:


After successfully pairing your mobile phone, when there is a incoming call, the system will display the phones number automatically and play the ring tone of the mobile phone.





3) Switch the call to the mobile phone:

If you do not want to hear the call on the Gps device click the  on the touch panel and the call will transfer to your mobile device.



4) You can still hang up the call with the  symbol on the interface, after you switch the call to your cell phone.

5) If you need to use the touch pad to dial a extension you can touch the  symbol on the interface.

6) After you touch the  symbol you will see the keypad pop up on the interface, as shown in the picture below.



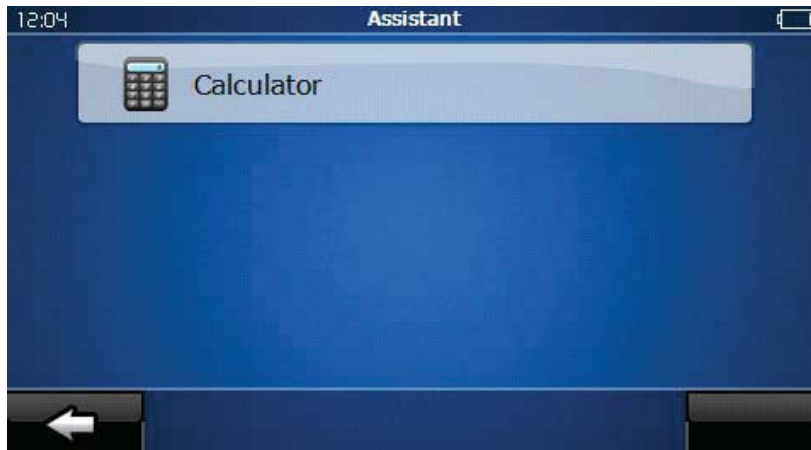
Calculator

6. Assistant:

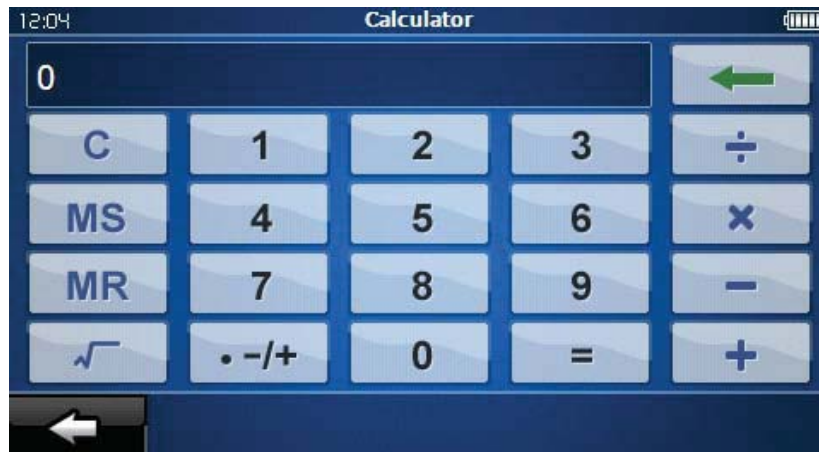
Introduction:


The Assistant tab is for the Calculator application.

1) After you press the Assistant tab you will get the Calculator Tab as shown in the picture below.



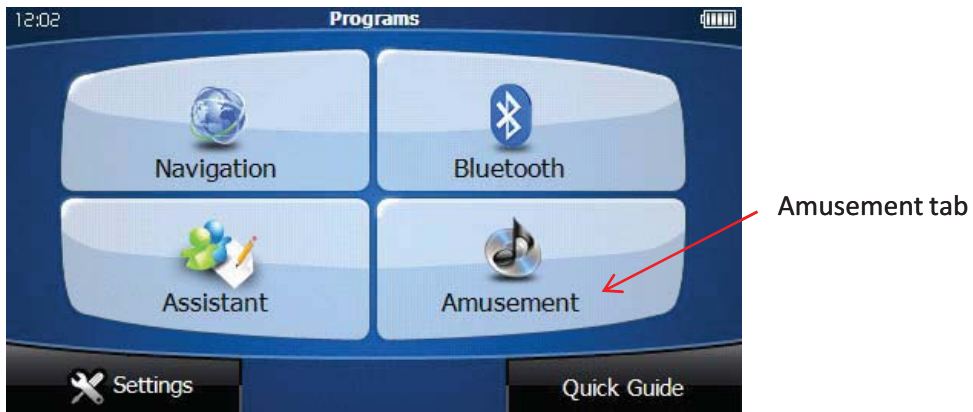
2) Press the Calculator tab and you will get the built in calculator as shown below.



3) To exit the Calculator press the  tab on the interface until you get back to the main display.

7. Amusement:

On the primary menu, touch the Amusement Icon to access your multimedia.



1) Touch the Music Icon to access your music on your SD card.














2) Next you will see the music folder as shown below



Music Interface



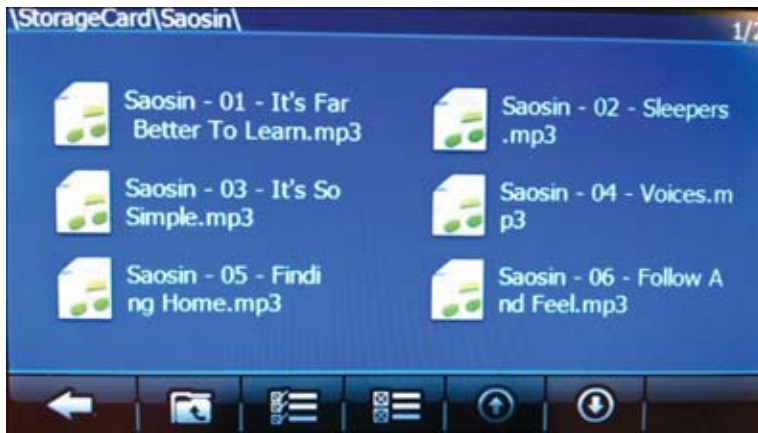
Icon	Button Name	Description	Icon	Button Name	Description
	Play	Play the Music		Stop	Stop Playing
	Last song	Choose last song		Random	Play the songs at random
	Next song	Choose next song		Play Repeat	Repeat the Songs
	Mute	Mutes the sound		Play list	Music play list
	Volume	Adjusts the volume		Return	Return to the last menu
	Help	Touch and enter into Amusement help			

Adding Music

1) When there is no audio file in the play list, the system will go to the content on the NAND Flash or SD Card, and then you can add the music



Find the music file to add music:








Click the names



then enter the play list:

Move the music file list up and down





Icon	Button name	Description
	Add songs	Add songs to the play list
	Delete Files	Remove files from the play list
	Delete all	Delete all files in the play list
	Select all	Add all the music in the content
	Clear all	Clear all files

Video Interface




Icon	Button Name	Description	Icon	Button Name	Description
	Play	Play the Music		Stop	Stop playing video
	Pause	Pause playing		Full Screen	View video in full screen
	Rewind	Choose the last video		Decrease video	Decrease videos in the playlist
	Fast-forward	Choose the next video		Delete all	Delete all videos in the playlist
	Volume	Adjusts the volume		Random	Play the video's at random
	Mute	Mutes the audio		Play circularly	Play the video's circularly
	Return	Return to last menu		Help	Enter into Amusement help

1) On the Amusement menu, tap  then you enter the movie player.


2) Add the video: Click "  " to enter the video documentaries list, click"  " to continue adding the video documentaries, then click "  " to add all the video documentaries (the detailed operation can refer to that of adding songs); Click "  " to return to the video player.





3) After adding the video documentaries, then Click the "  " to play the video.

4) Click the "  ", slide the volume strip"  " to adjust the volume. " to

Photo Interface






1) On the entertainment menu, tap "  " then you enter the photo viewing:



2) Adding pictures: Click "  " to enter the picture list and click "  " to add pictures (the detailed operation can refer to that of adding songs):





Move the photo file list up and down

Icon	Description	Icon	Button	Description
	Play		Next photo	Viewing next photo
	Zoom in		Last photo	Viewing last photo
	Zoom out		Full screen	Viewing a photo in full screen
	Rotation		Photo list	Viewing all the photo list
	Return		Help	Enter into Amusement help

Flash Interface


1) On the entertainment menu, tap "  " then you enter Flash player.



2) Adding the Flash files: Click "  " to enter the flash file list, Click "  " to add flash files (the detailed operation can refer to that of adding songs):

Icon	Button	Description	Icon	Button	Description
	Play	Play the flash		Silent	Mute the sound
	Stop	Stop playing		Volume	Adjust the volume
	Last Flash	Choose the last flash		Full-screen	Watch in full-screen viewing
	Next Flash	Choose the next flash		Play list	Display flash play list
	Return	Return to the last menu		Help	Click and enter into amusement help

Device Settings

Click "  Settings " on the main menu, then you enter the settings interface,



Return to main menu

Next page

FM Setup

1) On the settings interface, tap "  FM " ,then you enter the FM interface:



2) Click "  " to turn on the FM or Click "  " to turn the FM off. After turning on the FM, you can continue to choose whether to open the loudspeaker of the device, or you can not.




3) Click "  ", "  " or slide the block  to adjust the emission frequency, signal.

Time Setup

1) Click "  " to enter on the settings menu, then you enter the time settings




2) Date form: year-month-day, Click "  or "  " to adjust the right date




3) Default time form is 24 hours, Click "  " or "  " of the H(hour) or M(minute) to adjust the right time, Click "  " to change the time form between 12 hours or 24 hours.

After setting Click "  " to return to the last page.






Language Setup

1) Click "  Language " on the settings interface to enter the language setup





2) Click "  " to move down the pages of the language menu, and Click "  " to move up the pages of the language menu, Click "  " to exit language setup.

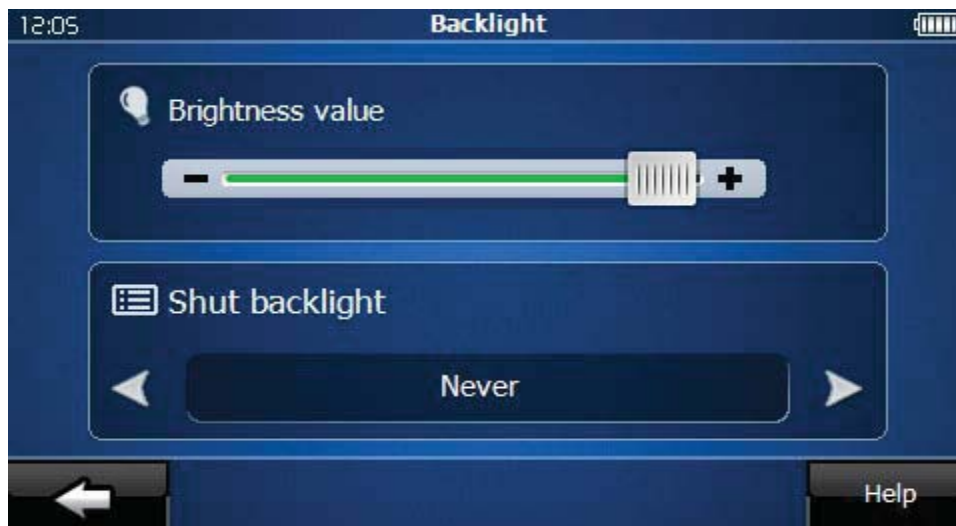
Volume Adjustment

- 1) Click "  Volume " on the settings sub-menu, then you enter the volume page. You can set the system volume and choose to enable key tones or not.
- 2) Slide the volume strip "  " to set the system volume.
- 3) Choose "  " or "  " to turn on or off the key tones. Then, Click "  " to save the settings and go back to the last page.



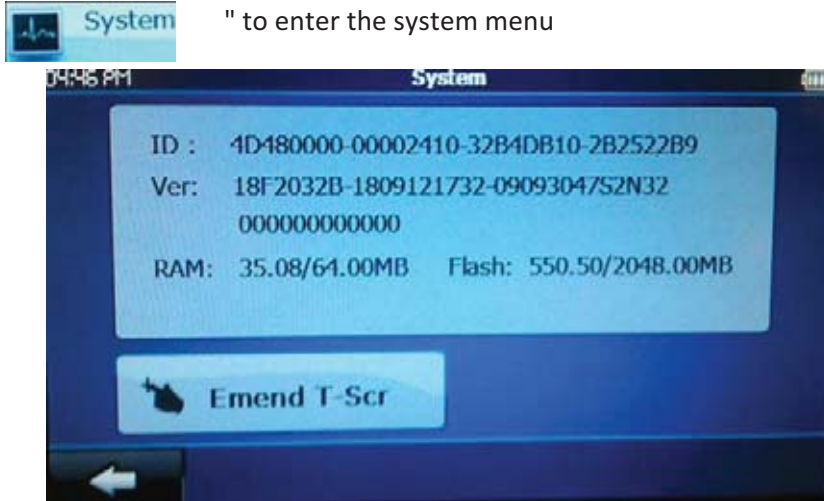
Brightness Setup

- 1) Click "  Backlight " on the settings interface to the brightness interface, then you can set the brightness of the display and set the idle time for the screen saver. Then Click "  to exit.



System Information

Click "▶" on the settings menu to display the content of the next page, then
Click "System" to enter the system menu



System Information:

- Id:** Id: GPS body number
- Ver.:** Software version number
- Ram:** It refers to internal caches. And the available capacity/
Total capacity =28.52MB/64.00MB
- Flash:** It refers to internal Flash memory, available capacity/
Total capacity=1880.36MB/2048.00MB
- Emend T-SCR:** Recalibrate touch screen

11. FAQ

What role does the electrical map play in the navigation system?

The electrical map is an application that integrates map data and navigation software, and the navigation action is implemented with the help of the software and the navigation system.

How long will it take for the positioning to be completed after turning-on?

The navigation system should meet the requirements of getting position parameters with 60 seconds. But the time to position is affected sometimes by factors such as satellite signal shelter, SA interfere back-off of a mountain or building), climate, environment etc.

Why does the positioning take longer sometimes?

The time to position may be longer in the following situations:

Gps satellites distribute uneven over the local zone.

Gps signal can not pass through most opaque solid matters, and the signal receiving is interfered by shelters above such as buildings, tunnels, trestles, trees, vehicle's blast-ban membrane etc., as well as weather conditions such as overcast and rainy days.

Is it free to receive GPS satellite signal with the navigation system?

Yes, the receiving the of GPS signal is free.

Can I obey completely the GPS navigation system during a trip?

The position and the route calculated by the navigation system is only for your reference, and you need to pay attention to the local codes and the traffic symbols during driving.

How precise is the navigation system?

The precision of the GPS, which comes with the satellite position technique of the USA army, is completely in the influence of the precision of USA's Gps satellite signal. According to the official data, the precision is within 10 meters; and commonly, it may be more precise in 6 meters at more than 90% time.

What to do in case of abnormal shutdown of the navigation system.

- 1) Press the POWER Key on the panel of the device and observe if the restarting is normal.
- 2) Check your power supply cable fuse, change it if it is broken.

Why does my GPS not work?

Sometime your car sits in the sunlight for a long period of time, roll down your windows or turn on you're a/c and let the car cool down. After the car has cooled down the mirror will come back on, this is a safety feature.

Why is it that some movie files can be played, while others of the same format can not?

Incompatibility may occur, because there are different compilation-modes and resolutions for the files of the format at current websites. All you have to do is convert their format using recommended conversion attached to the disk before playing them.